(calculated from published data). US cost data (2009, dog owner's perspective) were estimated from public sources. Health outcomes were expressed in days without symptoms of SP-W-A. All relevant input parameters were varied extensively in one-way and probabilistic sensitivity analyses, and therapeutic "break points" in costs and outcome were determined. **RESULTS:** Cefovecin was more effective than amoxi/clav (162 versus 158 days without symptoms of SP-W-A). Up to a bodyweight (b.w.) of 31 kg, cefovecin was dominant compared to amoxi/clav ($376.74 versus $382.34 respectively for dogs with b.w. of 25 kg) when considering total therapy expenditure (incl. anamnesis, diagnosis, treatments). In large dogs, cefovecin was more costly; however, total therapy costs were only <6% higher than amoxi/clav. Outcomes were sensitive to changes of non-compliance, but remained robust when varying other parameters. **CONCLUSIONS:** Considering non-compliance with oral treatments as a cause of treatment failure, cefovecin's higher drug and administration costs are totally or substantially offset by its better effectiveness leading to reduced costs for supplementary treatments of relapses and failures.

PSS20

ECONOMIC EVALUATION OF BIOLOGIC THERAPIES FOR MODERATE TO SEVERE PSORIASIS: ETANERCEPT COMPARED TO ADALIMUMAB AND INFLIXIMAB

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OBJECTIVES: To assess the cost-effectiveness of flexible dosing with etanercept compared with adalimumab or infliximab treatment in patients with moderate to severe psoriasis. **METHODS:** An economic model was constructed to estimate the incremental cost per quality adjusted life year for each therapy compared with no systemic therapy (NST). Patients met UK criteria for biologic treatment, which require both a Psoriasis Area and Severity Index (PASI) and Dermatology Life Quality Index (DLQI) > = 10 at baseline. Initial response rates were taken from registration studies for each agent: quality of life gain associated with response from patient level data in etanercept studies. Adalimumab and infliximab were given continuously in line with product licenses. Etancercept can be used flexibly, with some patients experiencing drug free intervals between courses of therapy: UK observational data found that 64% of etanercept users experience such intervals, with the remainder having continuous therapy. Response and withdrawal rates were taken from clinical studies, and extrapolated to a time horizon of 10 years. Costs were estimated from a UK payer perspective including drugs, administration visits and hospital stay for treatment failures. Stochastic analysis was undertaken to quantify uncertainty. **RESULTS:** The model estimated incremental cost-effectiveness ratios (ICER) of each therapy compared with NST to be: £12,600 (95% CI: £10,131, 14,066) for etanercept flexible dosing; £17,975 (£17,779, 31,106) for continuous adalimumab and £44,377 (£44,038, 73,815) for continuous infliximab. The ICER for etanercept therapy was sensitive to the frequency and duration of drug free intervals in these patients but was below the ICER for continuous therapies. **CONCLUSIONS:** The model found flexible dosing with etanercept to be more cost-effective than continuous therapy, as it allows control to be maintained at lower drug cost. This finding is consistent with a previous publication (Sitzo 2008), but has now been confirmed with drug utilisation data from UK practice.

PSS21

COST-EFFECTIVENESS OF A NEW TOPICAL PRESERVATIVE-FREE OPHTHALMIC ANTIBIOTIC TREATMENT WITH MOXIFLOXACIN IN THE NETHERLANDS

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OBJECTIVES: This study aimed to estimate the cost per treatment failure avoided of topical preservative-free moxifloxacin (MOXI) as compared with ofloxacin (OFLOX), marketed as preserved Trafloxal and preservative free Trafloxal E.D.O.in the treatment of acute infectious conjunctivitis in The Netherlands (NL). **METHODS:** A survey amongst GPs and Ophthalmologists (OPH) collected health care resources(HCU) used to manage acute bacterial conjunctivitis. Cost of health care resourses were obtained from National databases; treatment failure rates were estimated from a meta-analysis of randomized controlled trials(RCT) investigating MOXI. A decision tree model in Treeage was populated to define the cost per treatment failure avoided using MOXI instead of OFLOX. OFLOX treatment failure rate was obtained from a trial directly comparing OFLOX with MOXI. Probabilistic sensitivity analysis was performed investigating the range of HCU used in clinical practice by different OPH and investigating the uncertainty around treatment failures reduction. **RESULTS:** The average estimated incremental cost per treatment failure avoided by a GP was €53.47 and €215€ by an OPH (range €169.55€ to €279.42). The treatment failure rate for MOXI was 2.9% [with 95% CI 1.4%,4.3%] versus 7.6% for OFLOX. The price for MOXI taken in the model was €14.04, the maximum reimbursement of current preservative free antibiotic treatments in NL. A weighted current average price of Trafloxal (110,943 units) and Trafloxal E.D.O.(15,554 units) was €3.74. With a failure rate less than half that for OFLOX, and assuming a willingness to pay (WTP) of 100€ per treatment failure avoided (based on the WTP for avoiding allergic reactions), in 90% of the simulations MOXI is cost-effective. **CONCLUSIONS:** Use of topical moxifloxacin instead of ofloxacin avoids treatment failures. Moxifloxacin, with a price of 14,04€ is a cost-effective alternative to ofloxacin given a willingness to pay of €100 per treatment failure avoided.

PSS22

COST-EFFECTIVENESS STUDY OF COMPLICATED SKIN AND SKIN-STRUCTURE INFECTION TREATMENT IN MEXICO

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OBJECTIVES: To determine the most cost-effective intravenous antibiotic treatment for complicated skin and skin-structure infections (cSSI) in public health care institutions in Mexico. **METHODS:** A cost-effectiveness study with institutional perspective was conducted comparing the use of either i.v. Daptomycin (DAP), i.v. Vancomycin (VAN) or i.v. Linezolid (LIN) as first-line and/or second-line antibiotic therapy. Data was collected from a systematic review which included the most recent published articles measuring clinical improvement, length of stay at hospital services and adverse events due to the use of any of three alternatives. A decision tree with Bayesian approach was designed to simulate the use of resources based on patient's prognosis considering clinical success as the best health state, reached in either short hospital stay or long hospital stay, and a therapeutic failure of first-line antibiotic therapy (DAP, VAN or LIN) which caused the use of a second-line antibiotic therapy (DAP or LIN depending on first election). Costs calculation considered hospital stay, concomitant medication and selected antibiotic treatment. Results were evaluated with incremental analysis and one-way sensitivity analysis of the most uncertain variables. **RESULTS:** The use of DAP as first-line therapy results in the lowest cost per clinical success (CS) (DAP: US$3,405.00/CS; VAN: US$3,550.00/CS; LIN: US$3,870.00/CS). In case of therapeutic failure of DAP, the use of LIN as second-line therapy resulted in the lowest total cost per clinical success (DAP-LIN: US$3,255.00/CS; VAN-DAP: US$3,310.00/CS; VAN-LIN: US$3,310.00/CS; LIN-DAP: US$3,423.00), reaching 98% of CS. The sensitivity analysis varying clinical success rates of every evaluated alternative confirmed the robustness of base study. **CONCLUSIONS:** Daptomycin is the most cost-effective alternative in the treatment of cSSI when used as first-line antibiotic therapy since its use reduces the length of hospital stay reducing expenses of public health system budget in Mexico.

PSS23

COST-EFFECTIVENESS ANALYSIS OF IMIQUIMOD VERSUS NO TREATMENT IN ACTINIC KERATOSES

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OBJECTIVES: The purpose was to conduct a cost-effectiveness analysis (CEA) of imiquimod therapy compared to no treatment in patients with actinic keratoses (AKs) in Poland. **METHODS:** The analysis was based on a decision model regarding clinical effects of imiquimod therapy in comparison to placebo (vehicle cream), determined in randomized clinical trials. The population was defined as adult patients with actinic keratoses, without hypertrophy and keratosis, with typical course (localisation on head skin), competent immune system of patient, when another treatment is contraindicated or inappropriate. Complete clearance was assessed as health outcome. Direct medical costs of the analyzed therapies were estimated from the perspective of both payers in Poland (National Health Fund and patient). Costs of medication and clinic visits were included. Time horizon of the analysis was 20 weeks. Treatment was assumed as once a day 3x/week, one or two 4-week cycles. Costs and effects were not discounted. **RESULTS:** Ratio of complete clearance was 0.620 for patients treated with imiquimod and 0.080 for patients taking placebo. Total costs of imiquimod therapy were estimated at 602.26 PLN, while costs of no treatment were 128.26 PLN. Incremental cost-effectiveness ratio (ICER) for the comparison of imiquimod versus placebo was calculated as 878 PLN per gained complete clearance. **CONCLUSIONS:** Imiquimod is more effective and more expensive than no treatment in patients with actinic keratoses. ICER value is below the acceptable threshold, therefore imiquimod therapy is considered as cost-effective treatment in Poland.

PSS24

COST EFFECTIVENESS ANALYSIS OF TAFLUPROST COMPARED WITH LATANOPROST ON THE TREATMENT OF PRIMARY OPEN ANGLE GLAUCOMA IN SOUTH KOREA

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OBJECTIVES: Glaucoma is associated with elevated intraocular pressure (IOP) which can develop nerve damage and loss of vision. Primary open angle glaucoma (POAG) or ocular hypertension (OH) patients should be treated with lowering IOP that is a major factor in preventing the progression of visual impairment related to glaucoma. Nowadays prostaglandin is recommended as first-line treatment drug for reduction of elevated IOP. The main objective of this study is to evaluate the cost-effectiveness of tafluprost compared with latanoprost in POAG or OH patients in Korea. **METHODS:** A decision analytic model was developed from a societal perspective for one year to estimate clinical outcome, drug cost and glaucoma related cost. The model assumes pathways like following: successful treatment, switching to other drug, adding other drug, laser or surgery. Transition probabilities of successful treatment is defined as the percentage of patients with elevated IOP achieving <20% reduction, and transition probabilities of switching is the percentage of patients who were withdrawn due to severe adverse events. IOP reduction rate and transition probabilities were obtained from published literatures searched in database. Resource utilizations and costs were calculated with Korean national health insurance data and clinical expert opinions. Sensitivity analyses were performed on crucial parameters. **RESULTS:** Tafluprost is